Gulf of Mexico Harmful Algal Bloom Bulletin

20 December 2007

NOAA Ocean Service

NOAA Satellites and Information Service

Last bulletin: December 17, 2007

Conditions Report

E Florida: A harmful algal bloom persists from central Volusia to northern St. Lucie County. Patchy moderate impacts are possible today, Saturday, and Sunday for central Volusia, and southern Brevard County, with patchy very low impacts possible on Friday. Patchy high impacts are possible today, Saturday, and Sunday in southern Volusia, northern Brevard, and southern Indian River County, with patchy moderate impacts possible on Friday. Patchy low impacts are possible today, Saturday, and Sunday in St. Lucie County, with patchy very low impacts possible on Friday. No other impacts are expected today through Sunday, December 23, along eastern Florida.

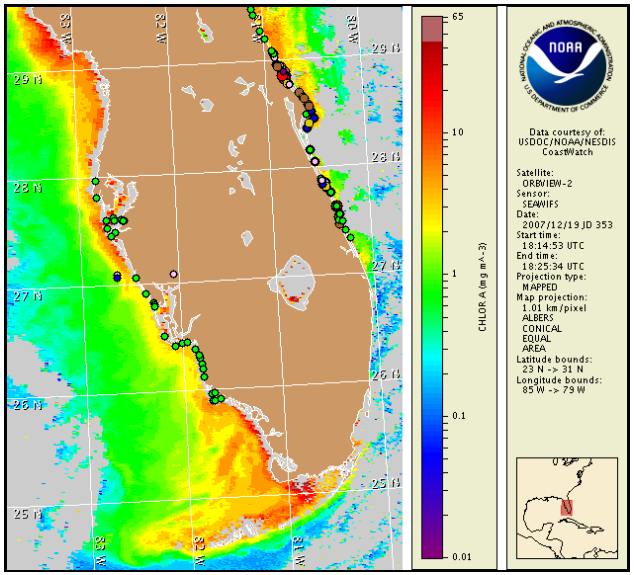
SW Florida: There is currently no indication of harmful algal bloom presence along southwest Florida. No impacts are expected in southwest Florida today through Sunday, December 23.

Analysis

E Florida: A harmful algal bloom persists along the eastern coast of Florida from central Volusia to northern St. Lucie County. Recent sampling results continue to indicate no presence of *K. brevis* in Flagler County (FWRI; 12/18). However, concentrations appear to have increased in southern Volusia County, with high concentrations confirmed on 12/17 (FWRI) near the Brevard/Volusia County border in Mosquito Lagoon, after very low to medium concentrations were confirmed on 12/10-11 (FWRI). Additional medium concentrations of *K.brevis* were confirmed at Cocoa Beach and Jetty Park this week (FWRI; 12/16-17) in Brevard County. Recent samples taken in St. Lucie County at Pepper Park, Frederick Douglas Memorial Park, and Walton Rocks Beach indicated no presence of *K. brevis* (FWRI; 12/18). Fish kills were reported this week at Cape Canaveral in Brevard County. Satellite imagery from 12/19 indicates that chlorophyll levels have decreased along the coast from Flagler to northern Brevard County. Imagery is obscured from northern Brevard through Martin County, limiting analysis. Easterly winds today, Saturday, and Sunday may increase the potential for impacts along the coast. ****Due to extended holiday closure on Monday, December 24, the next bulletin will be disseminated on Wednesday, December 26. An updated Conditions Report will be sent Friday, December 21, stating expected impacts through the closure.**

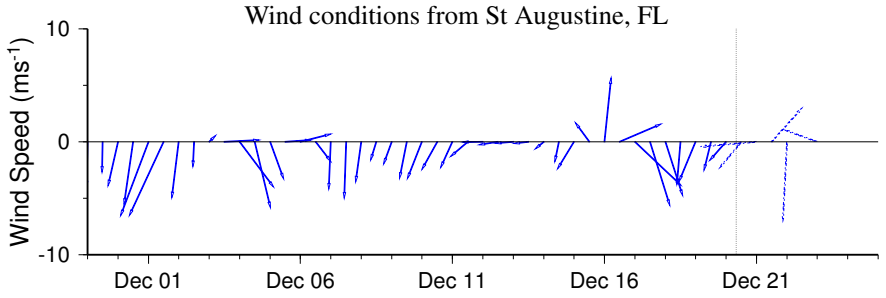
~Keller, Allen

****Please refer to subsequent South Florida Bulletin for analysis and information on southwest Florida and the Florida Keys.**



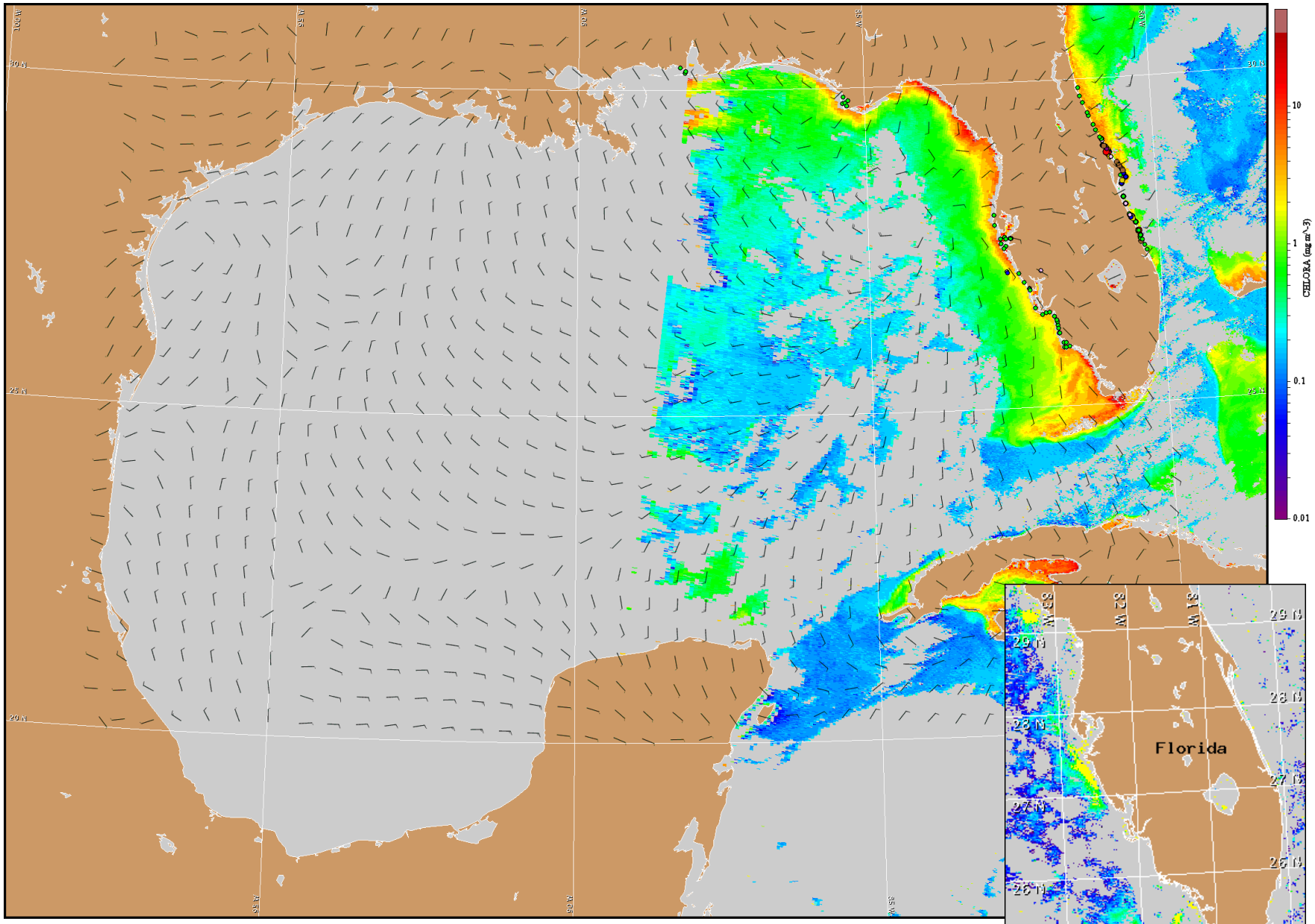
Satellite chlorophyll image with possible HAB areas shown by red polygon(s). Cell concentration sampling data from December 10 to 18 shown as red (high), orange (medium), yellow (low b), brown (low a), blue(very low b), purple (very low a), pink (present), and green (not present). For a list of cell count data providers and a key to the cell concentration categories, please see the HABFS bulletin guide:

http://www.csc.noaa.gov/crs/habf/habfs_bulletin_guide.pdf



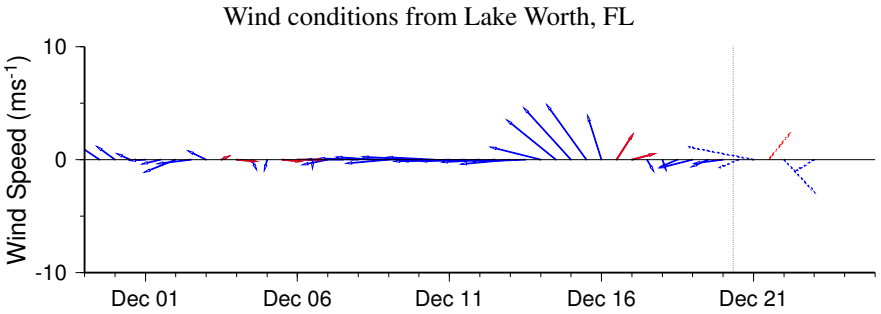
Wind speed and direction are averaged over 12 hours from buoy measurements. Length of line indicates speed; angle indicates direction. Red indicates that the wind direction favors upwelling near the coast. Values to the left of the dotted vertical line are measured values; values to the right are forecasts.

E Florida: Easterly winds today becoming southeasterly this evening (10-15 knots; 5-8 m/s). Southwesterly to northwesterly winds on Friday, becoming northeasterly on Saturday (10-15 knots; 5-8 m/s). Easterly winds Saturday night and Sunday (10-15 knots; 5-8 m/s).



Satellite chlorophyll image and forecast winds for December 21, 2007 12Z with Cell concentration sampling data from December 10 to 18 shown as red (high), orange (medium), yellow (low b), brown (low a), blue(very low b), purple (very low a), pink (present), and green (not present). For a list of cell count data providers and a key to the cell concentration categories, please see the HABFS bulletin guide: http://www.csc.noaa.gov/crs/habf/habfs_bulletin_guide.pdf

Verifi ed and suspected HAB areas shown in red. Other areas of high chlorophyll concentration shown in yellow (see p. 1 analysis for interpretation).


Wind conditions from Lake Worth, FL
Wind Speed (ms-1)
10
0
-10
Dec 01
Dec 06
Dec 11
Dec 16
Dec 21